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"The Canadian Hospital"

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Canadian Hospital Council

Vol. 18

FEBRUARY, 1941

No. 2

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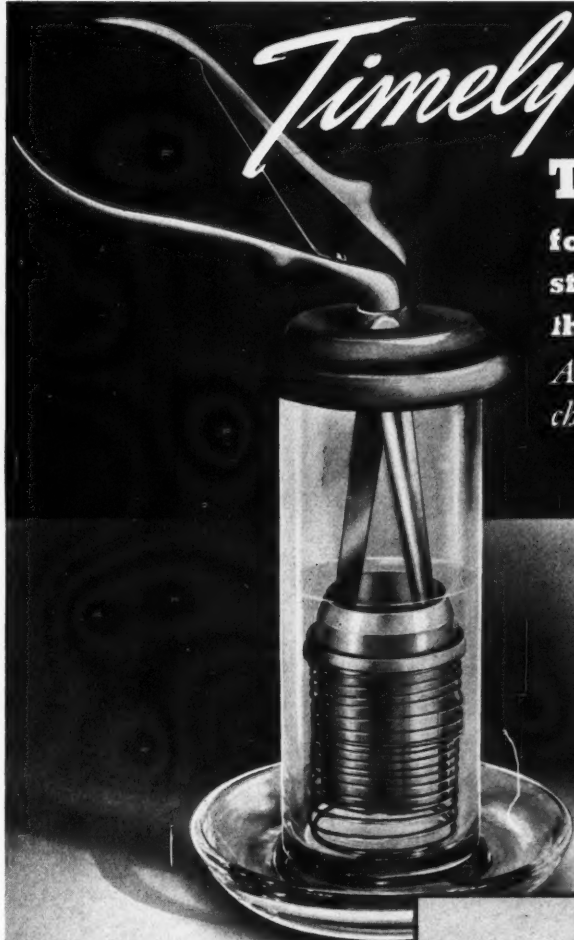
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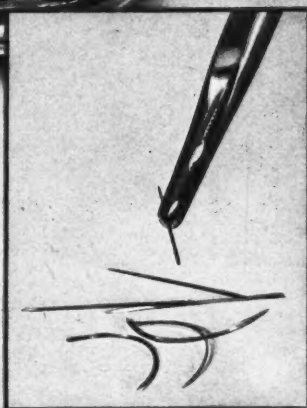
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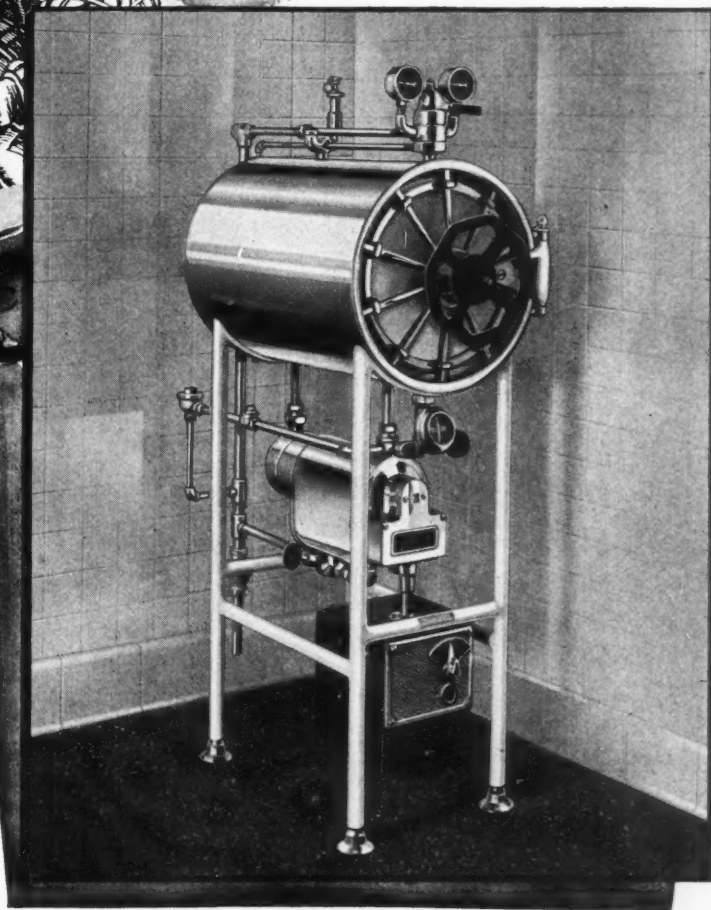
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THE HUMAN NEED FOR IODINE

● Like calcium and iron, iodine is commonly considered as an essential mineral which may be supplied in sub-optimal amounts by Canadian diets. Unlike calcium and iron, the human daily requirement for iodine cannot be as closely approximated as can the human needs for those two minerals.

Many researches (2) have established that a deficiency of iodine in food and water may produce a derangement of the thyroid gland known as simple or endemic goitre. The management of this condition, once present, is properly a matter for competent medical attention. However, it is agreed that normally the prevention of endemic goitre is purely a nutritional problem and that control of this disorder can be effected by providing for an adequate daily supply of iodine. It has been suggested (1, 2) that the probable human iodine requirement lies between 0.05 and 0.10 milligram per day, the higher amount being indicated for children and for pregnant and lactating women.

Due to the fact that the foods and water in certain regions—especially the so-called “goitre belt”—are low in iodine content, obviously some means

of enhancing the iodine intake of persons residing in such localities should be provided. For this purpose, iodized salt has been proven most effective and is commonly favoured for use under such circumstances (3). However, the low incidence of endemic goitre in sea-board localities—in which the plant and animal foods are exceptionally high in iodine—suggests the potential value of food sources of iodine.

Under normal circumstances, in goitrous regions, main dependence should be placed on iodized salt as a source of iodine. However, the value of foods high in content of this essential mineral should not be overlooked. As indicated above, foods grown in the coastal areas are exceptionally high in iodine; in addition, fish and marine products from coastal waters are also rich food sources of this element. Consequently, such foods—many of which are available as commercially canned foods—should serve as economical and convenient supplementary sources of iodine. Through intelligent use of iodized salt and the available food sources of iodine, an optimal daily supply of this dietary essential should readily be obtained.

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(1) 1939. Mineral Metabolism, Alfred T. Shohl, Reinhold, New York, N.Y.

(2) 1939. Food & Life, Yearbook of Agriculture, U. S. Dept. of Agriculture, U. S. Govt. Printing Office, Washington, D.C.

(3) 1939. General Decisions, Council on Foods, Amer. Med. Assoc., Chicago.

Harvey Agnew, M.D.,
Editor



CANADIAN HOSPITAL

Toronto, February, 1941

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No. 2

Civilian Hospitals Offer Extensive Facilities In Case of National Emergency

LAST month the Canadian Hospital Council completed a survey of the facilities available in civilian hospitals which might be utilized by the federal government should circumstances arise necessitating the use of facilities in civilian hospitals for military purposes. No unannounced danger of an imminent nature is threatening the nation, but in view of the intensity of the war and the speed of developments during the past year, it has been deemed expedient that the hospitals should participate in the general programme of preparedness to the extent at least that there would be known at Ottawa the extent of the facilities in plant and personnel which could be made available in an emergency. In making this survey the Canadian Hospital Council had the approval and co-operation of the Department of Pensions and National Health at Ottawa.

Forms were sent to all general hospitals of 50 beds or over and to tuberculosis sanatoria. It was realized that many smaller general hospitals would have facilities available and would be pleased to indicate a willingness to allocate a portion of their space for national purposes if necessary. However, most of these smaller hospitals are located in smaller

centres, many of them in isolated areas, and it was considered that for the purposes of this survey a general picture could be obtained by circularizing the hospitals mentioned above. It is anticipated, of course, that should a national calamity occur or a localized emergency arise in any one area, as for instance an aerial bombardment, all hospital facilities and personnel in every hospital would be made available as rapidly as beds could be evacuated.

The survey elicited the following information:

- (1) The existing accommodation which could be made available for government use in case of

emergency. This was differentiated according to the type of clinical service and the number of public and private beds available.

- (2) Whatever buildings on or near the hospital grounds could be utilized and, if bed equipment were supplied by the government, how many beds could be put into this extra space.
- (3) If absolutely essential, how many of the following groups of personnel could be spared without seriously crippling the work of the hospital: graduate nurses on staffs, graduate dietitians, occupational therapists, clinical laboratory technicians,

Summary of Replies

Beds available in case of national emergency	7,200
Additional space which could be set up if necessary	5,277
Total beds available in case of emergency	12,477
Expert personnel who could be released if absolutely necessary	496
Willing to provide short courses of training, if necessary	
Radiological technicians	184
Clinical laboratory technicians	189

ANALYSIS OF SURVEY

Civilian Hospital Facilities Available in Case of Emergency

(General Hospitals of 50 beds or over and Tuberculosis Sanatoria)

	B.C.	ALTA.	SASK.	MAN.	ONT.	QUE.	N.B.	N.S.	P.E.I.	CANADA
Surgical - public	98	30	54	4	270	380	68	80	5	989
Medical - public	160	30	56	36	261	614	44	62	8	1271
Medical or surgical - public	296	127	115	220	563	727	53	26	—	2127
Total public	554	187	225	260	1094	1721	165	168	13	4387
Surgical - private & semi - private	34	25	6	2	178	91	55	18	5	414
Medical - private & semi - private	59	100	5	19	227	134	15	5	10	574
Med. or surg. - priv. & semi - priv.	72	65	22	47	158	303	35	2	6	710
Total priv. & semi-priv.	165	190	33	68	563	528	105	25	21	1698
Isolation - public	42	70	8	131	91	45	10	30	3	430
Isolation - private & semi - private	4	—	18	5	56	22	4	15	10	134
E.E.N.T. - public	—	—	—	—	4	—	—	—	—	4
Obstetrical - public	8	—	—	—	54	3	4	5	—	74
Obstet. - private & semi - private	4	—	—	—	12	6	19	2	—	43
T.B. - public	42	20	—	—	62	110	—	10	—	244
T.B. - private & semi - private	—	—	—	—	—	15	—	—	—	15
Convalescent - public	—	—	—	10	52	—	—	—	—	62
Conval. private & semi - private	—	—	—	—	12	—	—	—	—	12
Existing beds which could be made available in case of national emergency	819	467	284	474	2000	2450	307	255	47	7103
Additional bed space which could be converted in emergency (Equipment supplied by Government)	553	188	337	146	1374*	1476	931	164	108	5277
TOTAL NO. OF BEDS AVAILABLE IN CASE OF EMERGENCY	1372	655	621	620	3374	3926	1238	419	155	12380

* This includes a maximum of 300 beds at Chorley Park offered by the Hospital for Sick Children, Toronto, and now being used by the government.

(In addition general hospitals offered a total of 97 paediatric beds or equivalent space. Children's hospitals reported an additional 100 beds available with space for 135 additional beds. Total 332 beds.)

Personnel Now Employed in Hospitals Who Could Be Released in Case of Emergency

(Without seriously crippling civilian care)

	B.C.	ALTA.	SASK.	MAN.	ONT.	QUE.	N.B.	N.S.	P.E.I.	CANADA
Graduate nurses	16	41	38	22	48	172	2	27	1	367
Graduate dietitians	1	1	1	2	12	7	2	1	1	28
Occupational therapists	1	2	—	—	7	5	—	—	—	15
Clin. laboratory technicians — M.	1	—	—	1	3	2	—	1	—	8
Clin. laboratory technicians — F.	5	3	3	1	10	6	1	2	—	31
Radiological technicians — M.	—	—	1	1	3	5	1	1	—	12
Radiological technicians — F.	1	3	3	1	3	11	—	2	—	24
Pharmacists — Male	—	—	—	1	—	—	—	—	—	1
Pharmacists — Female	—	—	—	—	2	7	1	—	1	11
	25	50	46	29	88	215	7	34	3	497

Number of Technicians Who Could Be Taken in for Short Courses of Training

	By provinces									CANADA
Radiological technicians	10	13	13	10	71	40	13	11	2	183
Clin. Laboratory technicians	9	14	16	10	79	44	4	11	2	189
	19	27	29	20	150	84	17	22	4	372

Percentage of returns (by provinces) 67% 64% 71% 65% 77% 60% 73% 65% 100% 69%

radiological technicians and pharmacists.

- (4) If requested by the government, how many additional persons could be accepted for adequate periods of training as radiological technicians and as clinical laboratory technicians.

These data are summarized in the accompanying tables. The majority of the hospitals have very little accommodation which is not now in use. Some, however, could evacuate some of the less serious cases and could make some of the accommodation available if necessary. A number of the hospitals intimated

that in case of emergency their entire facilities would be available. These replies had to be evaluated individually as there was obviously considerable variation in interpretation of a national emergency, despite the careful wording of the questionnaire.

In summarizing these replies an effort was made to correlate them to a situation wherein extensive facilities in civilian hospitals might be necessary for the care of either military or civilian casualties resulting from military operations, but in general the care of the ordinary civilian diseases and accidents would need

to be cared for. Therefore, if a busy hospital providing the sole means of hospitalization to a large area stated that it offered its entire facilities (as was done in a number of instances) such reply was not included in the totals here given, as it was obvious that the official making the reply envisaged a state of emergency more calamitous than was intended in the questionnaire.

On the other hand, where certain hospitals were located in areas where other civilian hospitals could readily take over the care of civilian patients if necessary, the offer to

(Continued on page 42)

Group Hospitalization—the Logical Solution

GEORGE F. STEPHENS, M.D.
President, Canadian Hospital Council

GROUP Hospitalization or the "Hospital Service Plan" is a means by which employed people may protect themselves against the expense of hospitalized illness by small, regular payments deducted from the pay roll.

The principles of insurance, fire, hail, death, are well known and the losses can be accurately predicted. Hospitalized illness can equally be determined for a group, but not for the individual—hence the value of such protection. The "plans" are not operated for profit, but they are not a charity. They come between private enterprise and social insurance.

They afford protection to the public who are responsible for the maintenance of hospitals, by a reduction in the charity load; to the patient who benefits directly and to the physician who has less reluctance to send his patient to the hospital and is also more sure of collecting his professional bill.

Group hospitalization is not an American invention. It has long been in effect in a number of parts of Canada, but, as in many other things, it has been improved and put into mass production in the United States and we are glad to have it return to us with these improvements.

A Typical Plan

A typical plan is one where subscribers from employed groups pay a definite amount, perhaps 60 cents, 75 cents or \$1.00 a month to provide hospital coverage and an additional amount, perhaps 25 cents a month, for half coverage for the subscriber's dependent family. Complete coverage is given in some plans at a slightly higher figure. A definite period in hospital is provided, usually twenty-one days a year in semi-private accommodation. As

An address given at the conventions of several western hospital associations in October.

much as possible should be included in the way of special services, though to avoid abuse it may at first be necessary to limit some of these. In districts where local conditions do not permit its inclusion, x-ray is made an extra. Laboratory examinations, operating room, anaesthetic materials, ordinary medicines and dressings should be provided as part of the service.

First of all there is set up a voluntary administrative organization with representation from the hospitals, the public and the medical profession. To this the subscriber pays his or her monthly fee. This administrative organization (or fund) pays the hospital a stipulated rate per day for service rendered, a rate based on full cost. There is no charitable aspect to this service. It is desirable that all the "approved" hospitals in a community be members, thus allowing the subscriber free choice of hospital, a most desirable privilege. As membership grows and the financial condition of the "fund" improves, reserves are set up. When these are considered adequate, profits are returned to the subscriber in the form of increased benefits or lower subscription rates. The method of obtaining membership through employed groups lessens the cost of collection and distributes the risk. Individual membership is, as a rule, costly and unsatisfactory, as obviously the poorest risks are the first to join.

The member hospitals assume full economic responsibility and really do the underwriting. This is the main difference between the voluntary plans and stock or mutual insurance companies.

Medical service plans may be added, but these can only develop when and if they are enthusiastically sponsored by leaders of the medical profession of the community. Hospital service plans themselves in many places met active opposition from the medical pro-

fession, in others a deadly inertia and seldom the active support of the doctors. This condition has entirely changed as these plans have more and more demonstrated their soundness and benefit, for hospital service is social insurance of a non-governmental character, paid for by the subscriber and without the disadvantages of political control.

The Commission on Hospital Service of the American Hospital Association has approved sixty-six plans on this continent. Some 5,607,000 persons are covered; 1,594,000 were added this year by new "plans" (Oct. 1st. 1939—Oct. 1st. 1940). Organization and administration costs vary from 10% to 15%, which means that 85 cents to 90 cents of each subscriber's dollar is paid out in benefits.

Almost \$50,000 a year is spent by the American Hospital Association and its Commission on Hospital Service, or the Conference of Plans, on research of a statistical character and studies to improve the quality and stability of these plans. Figures are now available from which actuarial deductions can accurately be made.

In determining whether plans should or should not be approved the Commission on Hospital Service enquires carefully into the set-up, the evidence of financial stability, whether there is adequate working capital, the administrative policy, the type of management and representation, its non-profit character, whether the hospitals are behind the plan, whether freedom of choice of hospital and freedom of choice of physician is allowed, whether the rates and benefits are equitable, whether its accounting and statistical records are sufficiently detailed, its enrollment regulations and procedures sound and its prospects for membership good.

Being satisfied on all these points, approval, which is subject to an

(Continued on page 44)



How Serious is a Sneeze?

New Type Photography Illustrates Danger

SANITARIANS recognize the dangers of the spread of respiratory infections by microorganisms from the mouth and respiratory passages introduced into the air in the droplets given off in coughing and sneezing. Since most of such droplets are not visible under ordinary conditions the risks of infection by this means have not been appreciated by the lay public.

The above photograph, taken by Prof. M. W. Jennison, Department of Biology and Public Health, Massachusetts Institute of Technology, shows graphically the expulsion of droplets in a sneeze. The droplets are "stopped" in full flight.

The picture was taken using the Edgerton technique of high-speed photography, which substitutes an instantaneous flash of light for the opening and closing of a camera shutter. This stroboscopic light illuminates the object to be photographed with an intense flash of short duration. This technique "stops" objects in motion by providing a duration of flash (exposure time) so short that the object does

not move any appreciable distance during exposure. The light was placed in such a position that the droplets were illuminated with a dark-field effect, thereby standing out sharply even in daylight, and giving photographic images larger than actual droplet size. The time of exposure was about $1/30,000$ of a second.

The photograph shows a violent, unstifled sneeze. In such sneezes, the numbers of droplets expelled are in the thousands, varying with the intensity of the expiratory effort. The number of bacteria per sneeze may be in the thousands. Most droplets are under 2 mm. in diameter, and many are less than 0.1 mm. The "muzzle velocity" of some droplets is as great as 150 feet per second. Large droplets may be expelled to distances of 12 feet, but the majority do not travel more than 2 or 3 feet.

The involuntary closing of the mouth near the end of a sneeze tends to form a restricted orifice, resulting in the production of more and smaller droplets. The number of droplets issuing from the nose in

an unstifled sneeze is insignificant compared with the number expelled from the mouth. Cough droplets are, in general, fewer in number and larger than sneeze droplets. Some droplets fall to the ground; others evaporate, leaving their bacteria suspended in the air, through which they may be disseminated by air currents. Covering the mouth in coughing or sneezing is effective in preventing introduction of droplets into the air.

Edmonton Hospitals Boost Rates

Acting on a resolution of the Alberta Hospital Association at its last meeting, Edmonton hospitals have increased per day rates, beginning January 1st. Adult patient rates are increased by 50 cents per day and rates for children have gone up 25 cents. Hospital Accommodation charges under the new schedule are: public ward, \$2.50; semi-public ward, \$3.00; semi-private, \$3.50 and \$4.00; private room, \$5.50.

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The United Church of Canada Supports Twenty-two Outpost Hospitals

By OLIVE I. ZIEGLER, M.A.

DOTTING the frontiers of our Western prairies, nestling in among the mountains of British Columbia, or covering wide stretches of Northern Ontario, twenty-two outpost hospitals of The United Church of Canada may be found continually at work. Day by day, unobtrusively and efficiently, these centres witness to the fact that the Christian Churches of Canada are not forgetful of the many and varied folk—miners, lumbermen, fishermen, Indians, emigrants from nearly every nation under the sun—who live in isolated communities, far from the centres of civilization.

It is obvious that the people who struggle for existence in these pioneer settlements have neither the initiative nor the money to build their own hospitals. As far back as the nineties, this situation was recognized. The need for hospital care was brought home to the consciences of Christian people by such outstanding men of the Church as

the Rev. R. W. Large of Port Simpson and the Rev. John Pringle, D.D., a pioneer missionary in the Yukon. In this hitherto unserved field, as in so many others, the Christian Churches of varying faiths pioneered.

Pioneer Leaders

The earliest step taken by the Canadian Methodist Church occurred in 1889, when Dr. H. E. Bolton gave up his private practice in Ontario and moved to Port Simpson, B.C. On his own initiative, and without any guarantee from the Board of his church, he opened up among the Indians and other residents along the coast what was, to all intents and purposes, a medical mission. During the first year, his records show that he was consulted no less than 5,400 times! The need for a hospital became more and more acute and in 1892 Dr. Bolton's vision took visible shape in a building provided at no cost to the Mission Board of the Church, but placed under its care.

The first venture in the medical field on the part of the Presbyterian Church was the result of the insight and determination of Dr. John Pringle and of his descriptions of conditions among the "gold rush" miners of the famous "trail of 1898" in the Yukon. So keen was the interest aroused among a group of church women in Toronto that in 1898 work was begun in a canvas-covered shack at Atlin, 1,000 miles north of Vancouver. The following year a small hospital was opened with two nurses in charge, and for thirty years it continued to serve that far distant community.

From then, on down to the present day, progress has been steady—Bella Bella and Hazelton Hospitals in B.C., in 1898; Ethelbert Hospital in Manitoba, 1900; McDougall Hospital, Smoky Lake, Alta., 1906. Lamont Hospital in Alberta, with its fine training school for nurses came next in 1912. Then followed others, until 1937 when the latest hospital was built at Battle River in the heart of the Peace River district, approximately 300 miles northwest of Edmonton—making a grand total of twenty-two hospitals. Of these, nine are now supervised by the Board of Home Missions of The United Church of Canada, while thirteen are supported by the Women's Missionary Society.



Above. The hospital at Battle River, Manitoba.

Left. Pioneer hospital at Francois Lake, B.C.

Miss Ziegler, well known social worker and lecturer on current events, is the editor of "The Missionary Monthly" of the United Church of Canada.



Left—The hospital at Hazelton, B.C., original building erected in 1904.

Below—The present hospital at Hazelton.



We recall with interest that in one of those early hospitals the nurses were given by the government agent a cabin with a roof of mud and a floor of sawdust, while the pillows were stuffed with hay which had covered the cots in transit. When the cabin with its accommodation of four beds became overcrowded, a tent was put up beside

it. And we note, by way of measuring the progress, that in 1941, the Women's Missionary Society will open the new wing of St. Paul's Hospital, Hearst, Ont., recently erected jointly by the government and the Society—fitted with steam heating, a fine X-ray and a modern signaling system, and having accommodation for sixty patients.



The heated caboose at Teulon, Manitoba, for transportation of patients in winter.

The figures for 1939—the latest available—will give a general idea of the service rendered. The twenty-two hospitals have a total of 557 beds; during the course of the year 8,716 admissions were recorded and 1,404 births. Considering the home conditions from which many of the patients come, the mortality rate is amazingly low.

The nursing staff numbers 101—all graduates of recognized hospitals, with not only good academic qualifications but also a high sense of civic responsibility. Many of these nurses are in addition graduates of the United Church Training School in Toronto and are accredited home missionaries of the Church.

Where Life is a Struggle

Figures, however, can give no adequate idea of the beneficial results to countless of the less fortunate citizens of this country, that have



Left—An Indian patient accompanied by her pack dog comes to Cold Lake (Alta.) Hospital for treatment.

Below—Smeaton Hospital, Sask., gets a fresh coat of paint.





*Pioneer and present hospital
at Burns Lake, B.C.*

come through the ministrations of these hospitals. Perhaps a few stories of actual occurrences will make up this deficiency.

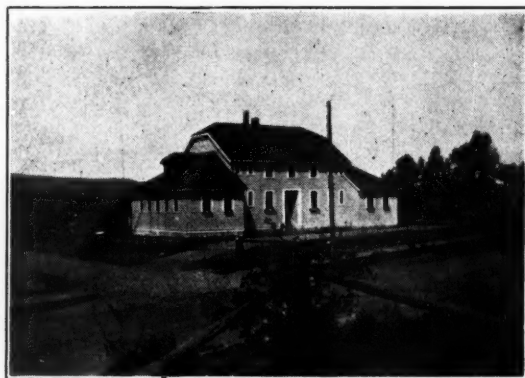
Writing under date of October, 1940, the Superintendent of Battle River Hospital, Miss Bawtinheimer, sends the following: "We had our first snow storm while Dr. Doidge was away in Edmonton in October. It made the roads terrible. One morning a man came to ask for help for his wife who had a very sore throat. I gave him medicine and the necessary instruction. About ten o'clock that night he was back again to ask if I would go and see her as she wasn't any better. It was very foggy and the roads so muddy that I knew it would be hours before the doctor could get to her, so I said I would go. The man had come on a tractor so I borrowed Miss Hunt's raincoat to keep the mud off and rode the three miles on the fender. It was my first ride on a tractor and I discovered to my surprise that the fender was round! I still don't know why I didn't land on my head. While we were going down hill, the mud stuck to the wheel until the land I was hanging on with was scraping it off. When we finally reached the house it proved to be a one-roomed cabin, with bunches of onions hanging over the bed.

"The woman was quite sick and I couldn't do anything for her there, so we decided to bring her back to the hospital. The men put a cot on a waggon, then just wrapped her up well in her bedding. There were several men there, so two came back with us to steady the cot and help

carry her in. They decided the tractor would be faster than horses, so we started back. This time I rode on what had once been a spring seat but was easier to stay on than the fender. I was so covered with mud the girls said they didn't know me, but I know it took a lot of water to get Miss Hunt's coat clean."

And from Ethelbert Hospital,

Manitoba, comes the following: "Early in October, 1940, the hospital celebrated its twenty-fifth birthday. At a special service held to mark the occasion, Dr. Gilbert, under whose leadership the present hospital was built in 1915, gave some illuminating anecdotes, which illustrate how the natural conditions in the district add to the difficulties. He recalled the story of a man who had walked thirty-five miles to the hospital to get a bottle of medicine, and on the way had to build a raft to cross the swollen river. About the same time, word came of two serious cases



of pneumonia in a house some distance across the river. The doctor took along the new nurse just arrived from Toronto and left her in charge. But by the following day the river was impassable and the nurse was marooned with her patients for a week. The doctor drove daily to his side of the stream and she came to the opposite bank. He



Cabin and canvas-covered shack, Atlin, B.C.

asked questions and gave directions for treatment; she succeeded in pulling both patients through by her care. The tragic days of the flu epidemic were also recalled, when even nurses succumbed and new nurses coming to fill their places had to be put to bed. Two Ukrainian girls who had been brought up at Ethelbert, one of whom had acted as the doctor's interpreter many times, were sent for and left the places where they were working to come and help the doctor until the crisis was over."

A Tribute of Praise

Not only in the distinctly medical field, but in many other aspects of the life of their communities do the staffs of these hospitals make their influence felt. Mrs. C. Maxwell Loveys, the Executive Home Missions Secretary for the Woman's Missionary Society, who had visited each and all of the hospitals in the course of her wide travels, pays them this fine meed of praise:

"Doctors and nurses assist in all useful church and community enterprises. They give leadership to young people, organize the children into religious education classes, frequently awaken an appreciation of better music, and through hospital libraries and book clubs make better literature known. Through the co-operation of W.M.S. members in the churches across Canada, they are generously supplied with bales of clothing, layettes and gay warm quilts, which they distribute widely. Especially at Christmas time, gifts find their way into many needy homes. In these and many other quiet ways they try to express the kind of neighbourliness which is the foundation of a sound community life."

Following in imagination through these forty-four years, the work of the men and women who built and manned these hospitals, we cannot but be impressed by this remarkable record of community service. Overcoming many seemingly insurmountable obstacles—isolation, the rigours of a northern climate, lack of equipment, ignorance and superstition on the part of the folk they were trying to serve—they fashioned centres of healing which remain their enduring monument.

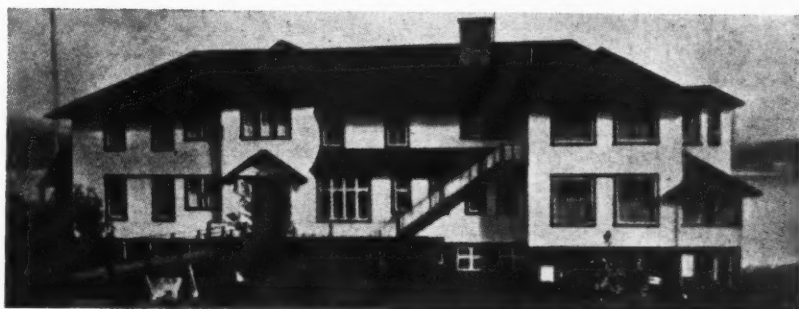
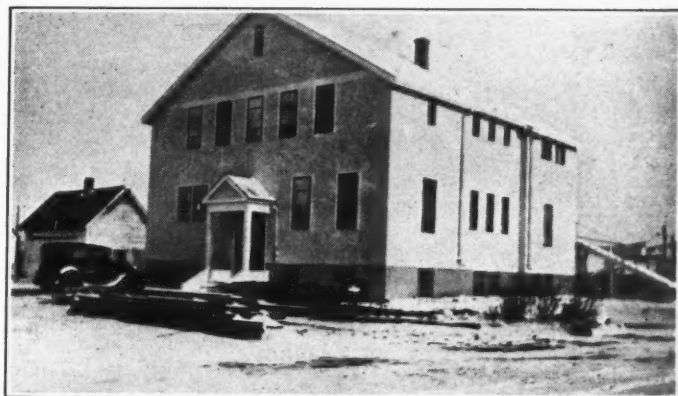
The outpost hospital is serving

needy folk to-day and will continue to serve to-morrow. But there are needy fields still untouched, waiting for the vision of the new pioneer.

The Hospital at Ethelbert, Manitoba.



Below — The Katharine Prettie Hospital at Bonnyville, Alta.



The R. W. Large Memorial Hospital, Bella Bella, B.C.



Lamont Hospital, Lamont, Alta.

What is a Fair and Uniform Schedule for Employees' Sick Leave, Vacations and Perquisites?

LEONARD P. GOUDY, Superintendent,
Saskatoon City Hospital

MANY hospital administrators contend that they can sense, after only a very short while in a hospital strange to them, the existence of *esprit de corps* amongst the employees. I believe that this is so; furthermore that one of the essentials to building this devotion of your employees to your organization is "adequate employee benefits".

Perquisites

The present trend favours discontinuance of perquisites in lieu of cash. Accommodation provided by the hospital must necessarily have a hospital air about it and it is considered preferable to have employees out of this atmosphere as much as possible while off duty. This trend applies to all types of staff, including nursing other than students.

Where values have been placed on board and room for purposes such as Workmen's Compensation Board or Income Tax Returns, the usual evaluation is \$25.00 per month. However that is the value to the employee. On calculating the cost to the hospital, if it is the intention to substitute a cash allowance for any part of the maintenance, then \$3.00 per meal (per month) and \$6.00 to \$8.00 per room, depending on local rates is about the usual.

Vacations

A check of a number of institutions shows that vacation periods and regulations controlling the granting of them are fairly standard. The vacations allowed generally are:

1. Substaff (porters, orderlies, maids, cooks, fireman, etc.) two weeks per year.
2. Office staff, records clerks, telephone operators, student nurses, department heads, and x-ray technicians—three weeks

per year. (The Canadian Society of Radiologists recommends one month for x-ray technicians.)

3. Graduate nurses in the capacity of supervisors, instructresses, etc.—one month per year.

Vacation should be with pay but with no allowance for maintenance.

Sick Leave

Sick leave in most cases corresponds to vacation periods. The same length of time off duty with salary should be allowed for illness.

In only very unusual cases are employees allowed to take salary equivalent to vacation pay and remain on duty, or save holidays for several years and then take a long one; unused sick time is not credited to the employee.

Some places do, however, give sick leave according to length of service.

Hospital employees, exposed as they are to infections, known and unknown, and working long hours, in contrast to other lines of commerce and industry, should be given some form of protection, such as sick time. Workers in the various trades are protected by the Workmen's Compensation Board in case of accidents. Hospitals have their occupational hazards just the same as has the industrial world.

In addition, we frequently force members of the staff, especially nurses and orderlies, to take sick leaves even though they are only slightly ill and would in most occupations remain on duty. This, of course, is largely because of the necessity of protecting patients. One of our orderlies was taken off duty for approximately three months because of a septic throat condition. After the first few days he had no symptoms other than positive swabs. Another orderly had a boil on his arm which caused him only slight dis-

comfort but it kept him off duty for several days.

Too, we must not forget that hospital employees, and especially those in contact with patients, are expected to be examples of health. You know how difficult it is for bald-headed barbers to sell hair tonic.

There is also ample opportunity for and danger of self-diagnosis and treatment by members of hospital staffs, especially if there is likely to be any loss incurred on their part if they apply for sick leave. Those of you who operate training schools will be aware that student nurses, who must make up for sick time, are more reluctant to report off duty than other types of employees.

Overtime

Overtime pay does not seem to present much of a problem in most institutions. Members of the staff are either on call in emergency as one of the terms of their employment, as in the case of x-ray technicians, dispensers, operating room nurses, engineers, etc., or are very infrequently required outside of their usual hours.

Should time off duty be lost it is frequently possible and satisfactory to everyone to give extra time off at some other time, and if not possible, then the usual rate of pay without maintenance seems to apply generally. Of course, a minimum must be set, and this, in my experience, will apply most often to maids who are often paid 50c. to 75c. for an evening's work of two to three hours.

Let us adopt an attitude of open-mindedness and tolerance when dealing with employees' benefits. If, as pathologists say, cancer is never cancer in its earliest stages, then let us deal with employees' problems before they are problems, rather than, by lack of proper treatment make necessary the development of labour unions.

An address given at the meeting of the Saskatchewan Hospital Association, 1940.

The Preparation of Manuscripts



General Observations

1. Put yourself in the position of the reader and ask, "What would I like to know about this subject if I were reading the article?"
2. Articles that tell "why" and "how" as well as "what" are usually most interesting.
3. If the subject is one that can be illustrated, try to send suitable pictures. A Chinese proverb says that one picture is worth 10,000 words.
4. Be brief. Hospital people have so much to read these days that they select the shorter articles first and then, if they find extra time, read the longer articles. Frequently they never find the time. If the subject cannot be covered in 1500 to 1800 words, consider breaking it up into two articles, each of which covers one aspect.
5. Try to organize the material in a logical sequence; don't jump all over the lot. Prepare an outline first and then follow it.
6. Where figures, tables or charts are suitable, do not hesitate to use them.
7. Before mailing your manuscript give it a final critical reading to ensure the accuracy of all statements, figures, quotations and spelling of proper names and to be sure that your meaning will be clear to the readers.

Preparation of Copy

1. All manuscripts must be typed double space and with wide margins. Never send material that is single spaced.

The above is a summary of the address given by Alden Mills, managing editor of The Modern Hospital at the meeting of the American College of Hospital Administrators held in Boston last October. The suggestions given in the manuscript are based on the experience of the editorial staff of the magazine.

2. Use one side of the paper only.
3. Number the pages consecutively.
4. Use white opaque copy paper in preference to onion skin or crinkled paper.
5. Send in the original and not a carbon copy.
6. Fold, do not roll, your manuscript.
7. Put your name, title or professional or business connection, and your address on each manuscript.
8. Give the initials or first name of every individual mentioned in your article, together with his official connections.
9. Extreme care should be exercised to prevent all essential facts accurately.
10. In general, avoid quoting other people. It is your facts and opinions that are wanted. If quotations are necessary, the source should be credited in the article itself, if possible. If footnotes are essential, please use the following form: author's surname, author's initials or first name, title of article, journal in which published, volume number, page number, month and day of issue and year. For references to books, the form is: author's surname, author's initials or first name, name of the book, place of publication, name of publisher, year of publication, page number.

Illustrations and Floor Plans

1. Photographic prints should be clear and distinct and made preferably on glossy paper. They need not be mounted. They should never be folded.
2. Diagrams and charts should be drawn with pen and black ink on hard white or on heavy

By **ALDEN B. MILLS**

*Managing Editor,
The Modern Hospital,
Chicago.*

muslin tracing paper. The rules that are to show in reproduction should be black.

3. Floor plans should be in the form of drawings, tracings or black and white prints. All working details should be omitted. Dimensions and the use of rooms should, insofar as possible, be noted in numerals and letters of sufficient size to be clearly legible when the plans are drastically reduced for publication. Rooms may be numbered and their use indicated by a legend appearing on the side of the plan. A graphic scale should appear on each plan. It is desirable to indicate the points of the compass.
4. Each picture or illustration should be accompanied by an appropriate legend, i. e. a statement of the things of importance that may be seen in the picture or that are necessary for an appreciation of the significance of the picture. For architectural pictures, for example, it may be desirable to tell the colours of the items illustrated. Photographs should be numbered consecutively to correspond with the numbers on the accompanying legends. Legends should be written on a separate sheet of paper.
5. All photographs, plans and diagrams should be packed with heavy cardboard or corrugated paper to prevent breaking, cracking or crushing. It is preferable to send plans and diagrams flat or rolled; never fold them.

Canadian Intern Board Facilitates Allocation of Interns for Ensuing Year

THE Canadian Intern Board for the second year has assisted in the allocation of interns to hospitals, this time for the year 1941-42. This year both the students and the hospitals were more familiar with the procedure required for the efficient functioning of the arrangement, and the actual allocation of the students was accomplished more expeditiously and to greater satisfaction.

The Procedure

The procedure is a simple one. Prior to November 1st, the final year students are required to make application to the hospitals wherein they would like to serve an internship and to submit the list of hospitals to which application has been made, arranged in order of preference, to the secretary of the Canadian Intern Board. The hospitals to which the students have made application are then expected to go over the application and to list those students whom they wish to have as interns. On a second list they are requested to select those among the applicants whom they would like to have as alternate choices should any of those included on the first list not be available because of their selection by another hospital placed higher on the student's list of preference. These listings of first and second choice are to be sent to the Canadian Intern Board by December 1st.

As soon as possible subsequent to that date, the Canadian Intern Board goes over the lists and allocates to the hospitals their first choice of interns insofar as that is possible. Where two or more hospitals indicate a willingness to accept the same intern (and this happens in a large number of instances), the Board consults the student's list of hospitals to which application has been made and allocates the student to that hospital highest on his preference list which has indicated its willingness to accept him.

By this method hospitals only obtain interns whom they are willing to accept and, wherever possible, obtain their first choice. Also, the student who has graded a number of hospitals according to preference receives that one highest on his list which is willing to utilize his services. Where a hospital's first choice is not available, because of a student's acceptance in another and preferred hospital, the alternate list submitted by the hospital is consulted and, as far as possible, interns are supplied from that alternate list in order of listing. By this means, both hospitals and students obtain as near their first choice as is possible.

Following the completion of the allocation of applicants, there are some hospitals whose quota is not complete and there will be some applicants whose applications have not been listed as first or alternate choice by any of the hospitals to which they have made application. The names of those two groups, hospitals on the one hand and available interns on the other, are then circulated to the respective groups with the hope that a mutual arrangement can be effected.

93% of Applicants Placed

This year 203 students made application for appointment through the Canadian Intern Board and 188

were placed—an exceedingly creditable showing. Since the announcement of the allocation about the middle of December, nearly all of the remaining students have been placed.

The Canadian Intern Board itself is a body or committee with representatives from the Canadian Association of Medical Students and Interns, a national student organization operating along sound and conservative lines, and the Canadian Hospital Council. The Canadian Intern Board is also closely linked with the Department of Hospital Service of the Canadian Medical Association.

The plan only affects graduate interns; therefore, the great majority of its applicants have been from Queen's University, University of Toronto, University of Western Ontario and the University of Alberta. In the case of Dalhousie, Laval, Montreal and Manitoba, the internships are largely of an undergraduate nature. At McGill the situation is somewhat different. Although given the university degree at the end of the fourth year, the students are not certified as eligible to apply for a licence to practise until the completion of a fifth year which is to be taken in a hospital approved by the university. Practically all of these internships are taken in Montreal hospitals. Among the

How Students Fared in Choice of Hospital

	1st choice	2nd	3rd	4th	5th	6th	
Alberta	30	2	2	0	0	0	34
Queen's	18	14	1	0	0	1	24
Toronto	79	11	10	2	3	0	105
Western Ontario	21	1	0	0	0	0	22
Others	3	0	0	0	0	0	3
Total	151 (80%)	18 (10%)	13 (7%)	3%			188 (100%)

203 applications there was one from McGill University, one from Dalhousie University and one from Yale.

Observations

A number of observations may be made on the Board's second year of operation. Many of the difficulties encountered in the previous year have been overcome, partly through better understanding of the *modus operandi* of the plan and largely because of better co-operation from both student bodies and from hospitals. The Canadian Intern Board has received communications from the student bodies of the four universities affected expressing satisfaction with the arrangements. The senior students are delighted to have their worries respecting their future internships solved at such an early date in the year; they realize, too, that they have come as near to obtaining the hospital of their first choice as would be possible under any circumstances.

In the case of the hospitals, sufficient time has not elapsed to permit a summary of their experience. A number of hospital administrators and staff men have expressed themselves as pleased. One at least has not been pleased with the result. Of the 33 hospitals approved for internship which are not closely linked with medical schools giving undergraduate or analogous internship the Canadian Intern Board reports that 13 received a full quota and 20 received a partial quota.

Shortage of Interns

The situation from the viewpoint of the individual hospital is affected largely by whether or not a sufficient number of good interns have been obtained. Actually, there are far from being enough interns to go around and a number of hospitals were not able to obtain their quota. In fact, two at least could not be allocated any interns at all. That such hospitals would not be happy over the arrangement is but natural.

This, however, could not in any way be attributed to the Canadian Intern Board. The Canadian Intern Board is not only impartial but is quite passive in this allocation. It is simply an avenue for bringing the students and the hospitals together to make their appointments

at a uniform and early date. The Board has no opportunity to divert appointments from one hospital to another, as it must be guided entirely by the preference lists submitted by the hospitals and the students. If one hospital receives a full quota and another receives no interns, it simply means that the students have preferred one hospital over the other. Over this the Board has absolutely no control. Some of the less sought after hospitals might have signed up a quota in the early fall, but experience has shown in previous years that the students break these contracts later when they receive word of an appointment elsewhere.

While the teaching hospitals have fared better than the non-teaching hospitals on the whole, this preference has not been any more marked than it was under the old haphazard method of making appointments. Actually, this year a number of the non-teaching hospitals, some at a considerable distance from teaching centres but which have established good reputations among the student bodies, fared better than certain teaching hospitals. One teaching hospital could not be assigned any interns.

Promptness Essential

In some instances certain hospitals were quite late in making their returns, although the hospitals received nearly all, if not all, of their applications by November 1st and were then given until December 1st to indicate their first and alternate choices. One hospital was eight or nine days late in sending in its list and another one did not mail its list until the day before Christmas, actually over a week after the allocation had been made.

As could be expected some minor difficulties arose. In one instance where there were two applicants with the same surname a hospital inadvertently confirmed the appointment to the wrong man. The Canadian Intern Board has been checking up, too, on those students, who have been tardy in acknowledging their appointments to the hospitals. This, of course, was a common occurrence under the old system; in fact, when students received word of their appointment

to two or more hospitals, they sometimes even allowed the following July the 1st to pass without writing that they were accepting an appointment elsewhere.

A problem has arisen in the case of those students who have also made application to United States hospitals. The Board hesitates to assign such students to a Canadian hospital if there is a likelihood of their being accepted across the border and possibly leaving the Canadian hospital with a vacancy. The situation has been considerably clarified this past year by a new arrangement in the United States whereby the great majority of the leading hospitals have agreed to make their appointments on November 15th. The English speaking hospitals in Montreal, too, accept other than McGill graduates and applications to these hospitals by students applying to other hospitals through the Canadian Intern Board raises a question similar to that involved in the application of students to American hospitals. The Board, however, obtained very fine co-operation from the Montreal hospitals and it was possible to complete the allocation by December the 15th.

The suggestion has been made that in view of the shortage of interns the Canadian Intern Board should apportion the available interns to the different hospitals, thus ensuring that all hospitals approved for internship would have a reasonable quota and that some hospitals would not have a full allotment while others fall short. Advocates of this procedure may not realize that interns cannot be rationed out as though they were so many pounds of butter. As the seeking of an internship by a student is entirely a voluntary procedure, not required for the licence to practice, the students will naturally select those hospitals wherein they feel they can obtain the best training. The Canadian Intern Board has the confidence of the hospitals and of the student bodies only because it has been strictly impartial in its interpretation of the desires of the two parties concerned.

On the whole, the evidence would indicate that the plan is proving its value.

Obiter Dicta

Pasteurization and Vitamins

THE death last month of Dr. J. W. S. McCullough, one of Canada's leading public health authorities, has removed from our midst one of the pioneer and doughty defenders of milk pasteurization. Since his semi-retirement a few years ago, he has kept up a spirited press controversy with several opponents of scientific enlightenment who were self-appointed spokesmen for the still not inconsiderable army of individuals who feel that milk to be right should still be well impregnated with barnyard bacteria. For a long time the cry of the opponents of pasteurization was that it was simply a racket on the part of the milk companies to squeeze out the individual distributor. With the realization that simple pasteurization plants could be installed without much expense and that, if necessary, small distributors could pool their resources, the argument shifted to that of destruction of essential vitamins. Although the scientific world was practically unanimous in exploding this idea, here and there individuals with some scientific training, although not necessarily in that particular field, have supported this contention that the value of the milk is impaired. Actually, scientific evidence, however, is practically never submitted.

Some recent work done by the Paediatric Foundation at the Hospital for Sick Children, Toronto, under very carefully controlled conditions, should go a long way to refute these claims. Investigators there obtained raw milk as delivered and mixed at the dairy before going through the pasteurization machine. Another sample of the milk was obtained after it had been pasteurized. The milks were then assayed for their vitamin A, B₁ (thiamin), and B₂ (riboflavin) content. Repeated tests revealed absolutely no difference in the content of these vitamins in the comparable raw and pasteurized samples. This finding is of tremendous importance for milk is a very rich source of vitamin A, a fair source of B₁ and an excellent source of B₂. The amount of vitamin D in milk is negligible.

The influence of pasteurization on vitamin C should be properly understood, as this effect is "played up" by opponents of pasteurization. There is a small but appreciable amount of vitamin C in milk and this is adversely affected by pasteurization. However, the studies at the Paediatric Foundation have revealed that this minute amount of vitamin C is lost simply by the milk standing twenty-four to forty-eight hours; therefore, even if the milk be collected in the usual way, bottled and

delivered in the raw state, the vitamin C would be of practically no value by the time it would be consumed. As a matter of fact, authorities on nutrition, while recommending milk for its nutritive food value, its calcium content and its vitamin A, B₁, and B₂ value, have long urged that other and more potent sources of vitamin C should be utilized, such as orange juice and other fresh fruit juices. This additional experimental evidence further confirms the wealth of irrefutable evidence that milk should be pasteurized before it be offered for sale to others.



Hospital Declares Dividend

IT is encouraging to note the increasing use of high-class publicity by our hospitals. One by one, the annual reports that come to our desk are departing from the stodgy, stereotyped style of yesteryear to adopt some of the briefer and more vivid forms of illustrated publicity which indicate a better knowledge of the psychology of a hurried public already inundated with more literature than can ever be read.

This year we were particularly impressed with a New Year's message sent out by the Public General Hospital at Chatham, Ontario. Affixing a highly coloured, embossed seal to focus attention, a letter was sent out to prominent citizens over the signature of William M. Gray, chairman of the board of Trustees, which emphasized that no request was being made but, on the contrary, a dividend was being declared. Accompanying this well worded letter referring briefly to the achievement of the hospital, was an ordinary bank counter cheque, made out to the "Community Bank of Good Health" and agreeing to "Pay to the order of any Citizen requiring such the sum of Fifty Years rendering Service before Dollars". Interest was to continue at 100%. This was followed by a single sheet of percentage charts showing percentage breakdowns under the headings of What patients used the hospital, How is the hospital financed, How does the hospital spend its money, apportionment of salaries, Classification of financial ability of patients and a breakdown of the nursing services provided by the various nursing groups in the hospital.

This carefully worded and concise outline of the hospital work and its strong appeal to charity make a New Year's letter which cannot but have a wide and lasting appeal and of which the main cost is that of personal effort on the part of a trustee or an administrator.

Canada's Gigantic Task

IT has taken a long time for the citizens of this country to realize the extent of the tremendous task which we have assumed. Most of us remember the comparatively easy financing of the last war and the modest scaling up of the taxes. What we have been slower to realize is that a highly mechanized war such as this one, with reduced allies and tightened international exchange has put an enormously greater strain on this country, already heavily burdened with the debts of the last war. If we are to follow the commendable policy of paying for this war as we go to as great an extent as is humanly possible, more of us must dig down into our reserves than ever before.

Canada's normal expenditures amount to some 450 millions of dollars; Canada's probable war expenditures for the year ending next month will amount to 850 millions—a total of 1,300 millions! That is a terrific budget for a country of 11 million people, yet we are warned to expect still heavier demands in the immediate future. In addition Canada is making large sums available to Great Britain by repatriating Canadian securities—probably some 300 millions in this present fiscal year. Despite a greatly stepped up income tax, which, with other levies and imposts is expected to yield an estimated revenue of 780 millions, the Hon. J. L. Ilsley warns us that “*we shall need to borrow in Canada in 1941 a sum that is likely to be much closer to a billion dollars than to half a billion dollars.*”

The need to purchase War Savings Certificates is an essential part of this financial programme. Canada needs *two million* pledges averaging \$5.00 per month. This will mean \$10,000,000 a month or \$120,000,000 per year. Such an objective can be reached only if practically every wage-earning person in Canada does his or her part. The War Savings Certificates plan is designed primarily for the person of modest income although all should participate. The task should not be difficult for the average family. During 1941 the national income will be at least one *billion* dollars greater than in 1939. The Minister of Finance has pointed out that bank deposits have increased 350 millions since the beginning of the war and now exceed the high level of 1929 by over 600 millions of dollars! Money is being spent as seldom before and shops reported the biggest Christmas rush in their history. With the realization that the money is in the country and that every dollar invested in buying safety for our country is not only aiding the overthrow of the enemy but is also lessening the diversion of needed war workers from non-essential luxury activities, our government does expect all of us to do our duty.

Hospitals are large employers of people of modest incomes. Although they have not benefited directly from the influx of money for war industries they have enjoyed steady and continuous employment. It is hoped that hospital employees will be given every opportunity and encouragement to purchase War Savings Certificates, not by fits and starts, but on a steady month-after-month basis, by which method only can the essential flow of credit be available to the government. Subscribe as heavily for War Savings Certificates as you possibly can.

FEBRUARY, 1941

The Philosophy of Hospitalization

THE modern hospital reflects the development of civilization. It mirrors man's religious attitudes, humanitarianism, technical progress, scientific attainments, social ideals—all of humanity's finer qualities.

The present philosophy of hospitalization is the product of recent years. It holds a definite conception of the community's responsibility for and attitude toward disease—its prevention as well as its treatment or cure—and the functional as well as the physical restoration of the disabled.

Our philosophy is concerned with a multitude of environmental and economic factors; with the environment from which the patient comes, in which he lives while in the hospital and to which he goes when he leaves the institution. It is interested in the economic factors that bear upon the patient before, during and after his stay in the hospital. There is also concern for the environmental and economic problems that bear upon the conduct of the institution as a civic-social-medical agency.

There is interest in organization for the proper and adequate care of the sick and, in order that the organization may function effectively, with the education and training of its personnel—physicians, nurses and numerous other professional and non-professional workers. The institution's organization must be well adjusted to its purposes with all of its divisions carefully and thoroughly integrated despite the marked degree of specialization. The care of the patient is the joint responsibility of many. Co-ordination and effective co-operation have become the outstanding characteristics of the modern hospital. It is proper and desirable that all members of the professional personnel be possessed of a scientific attitude of mind. They must also be imbued with the highest ideals in order that the institution may continue to be a kindly, sympathetic and humane agency.

From the Presidential Address of Dr. Arthur C. Bachmeyer to the American College of Hospital Administrators.



E. Anne MacLachlan

THE many friends of Miss Effie Anne MacLachlan, for a number of years assistant secretary of the Canadian Hospital Council, will regret her unexpected death on January 29th. Miss MacLachlan had formed a wide circle of friends in the hospital field, particularly among those who took an active part in the work of the Council. Owing to illness Miss MacLachlan had found it necessary to relinquish her position with the Council last summer but was apparently making a good recovery until a relapse occurred in January.

Miss MacLachlan had been a conscientious and faithful servant of the Council. Meticulous in every detail she ever placed her own interests secondary to those of the work in hand and much of the success of the Council can be attributed to her untiring efforts. Trained primarily as a record librarian, Miss MacLachlan served in that capacity at Christ Hospital, Cincinnati, at the Toronto General Hospital and at the Toronto East General Hospital before joining the staff of the Canadian Hospital Council. The funeral was held at her old home, Mount Forest, Ontario.

The Recording of "Deductions"

By **PERCY WARD**, Vancouver
*Provincial Inspector of Hospitals and
Chairman, Committee on Accounting and Statistics,
Canadian Hospital Council*

IT is a maxim of Canadian justice that the accused is innocent until proved guilty. It may be a good principle of hospital economics to regard a debtor as innocent of dishonest intent, at least until the hospital has complete information of the cause of his failure to pay. Indifference and forgetfulness on the part of the debtor are ever present consumers of potential hospital revenue. These traits are removable only by friendly and continual reciprocal contact. Sick persons expect sympathy to help bear their physical disabilities. They also expect sympathetic consideration in their efforts to solve the financial problems that usually accompany their stay in hospital. Kindly and discreet encouragement may turn an unsuccessful effort into a successful one. The most potent factor in the successful collection of hospital bills is co-operation. There is nothing more likely to destroy co-operation than to give the debtor cause to think he is regarded as a lemon that yields juice only when squeezed. A social service approach will develop and retain co-operation.

Hospital clients embrace all classes, from the few to whom the payment of a hospital bill is an incidental, to those to whom it is a serious and almost unsolvable problem. The problem assumes varying degrees of seriousness between these two extremes. Ability to wrestle successfully with the problem differs widely in different patients. Financially self-reliant persons resent a too great inquisitiveness on the part of the admitting officer. Such persons can be efficiently handled by a system of credit ratings, and by following the business procedures to which these persons are accustomed. But these financially self-reliant persons form but a small part of the clientele of the average voluntary hospital. Even among those who use private and semi-private rooms there are many persons who,

if approached diplomatically, will welcome well balanced advice in arranging their financial obligations, providing they can be convinced that their confidences will not be abused, or used unfairly to their disadvantage.

This is the third of a series of explanatory articles on the interpretation and use of the recommended system for accounting and statistical returns.

No hospital can ever effectively grasp the problems of its clients without recording information regarding them in such a way that the records become a reliable compass for the use of those that have to contact clients and negotiate with them. Without that compass hospital officials incur a serious risk of running on to the rocks of their client's susceptibilities.

Unpaid patients' accounts multiply rapidly even in small hospitals, and tend to become a disheartening tangled mass. This tendency is increased because months or even years may elapse between the giving of a hospital service, and the completion of the information necessary to classify the account correctly. If patients' accounts are to be kept under control, each one must be investigated and classified at an appropriate time. This means that current work must receive attention every day. Those amounts that are ready to be written off should be entered every day as soon as the information is complete.

Accounts awaiting information, and all open accounts, should be briefly recorded on small "tickler" cards filed in chronological order. These should become a follow up system which will keep all open accounts alive and bring them to

attention at the appropriate time.

Recording of Write-Offs

As soon as a given amount is ready to be written off, the item should be entered in a journal at once; and should be entered as a deduction from the month in which the write-off is justified, entirely irrespective of the month or year in which the service was given. The following is a brief description of a journal that has been found to be effective.

The journal is synoptic, and has separate columns under five general headings. The general headings and their sub-divisions are: General information; date, hospital number, and name. In-patients; rebates, courtesy, free, and bad debts. Out-patients; rebates, courtesy, free, and bad debts. One column for miscellaneous subsidiary accounts. General ledger; ledger account, debit, ledger account, credit. Explanation.

Rebate entries may be summarized in subsidiary "Contract" accounts under the general ledger. If they are, one entry each month is sufficient for the rebates so summarized. The remaining accounts are entered in the journal separately, and the entries are made from the individual patients' accounts to which the items are later credited. The entries in the general ledger columns can be made in summary form by consolidating contiguous detail journal entries of a like character. At the end of each month the in-patient and out-patient entries should be totalled, and the journal ruled off. A summary of the totals should be kept for use in obtaining the total rebates, courtesy, free and bad debts to be entered on the annual revenue and expenditure returns. The foregoing records of accounts written off must be adjusted at the end of the year so that the current year's revenue will not be distorted as a consequence of including write-offs from earnings of previous years.

(Continued on page 34)



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autoclaving. • After removal from the autoclave, at least six representative samples are taken from each sterilization load of 500 containers for final sterility tests. Another sample is tested on rabbits to establish freedom from pyrogenic effect. Failure of any container to pass these rigid tests means immediate rejection of the entire lot. • Each container is next individually inspected for color, clarity and freedom from foreign particles. As in the manufacture of ampoules, the solutions are made, filled and sterilized as rapidly as possible to reduce possibility of contamination to the minimum. • The exclusive Abbott Bulk Container is an additional feature. The bottle is specially

designed to resist high-pressure steam sterilization. The outer seal gives positive evidence that the solution has not been tampered with, and the inner cap is easily removed by the fingers without danger of contaminating the lip of the bottle. The cap liner is impervious to attack by the chemicals in the solutions. • Complete literature is available describing the technique for assembling and using Abbott solutions and equipment. It will be sent on request. ABBOTT LABORATORIES LTD., 20 Bates Road, Montreal, Quebec.



Here and There

By THE EDITOR

An Unusual Occurrence

IN most hospitals some unusual occurrence happens almost every day. Sometimes this may be a very dramatic incident; it may be an unusual accident, the possibility of which had not been foreseen; it may be an unusual clinical observation or a rare finding at operation or autopsy; it may only be a particularly witty comment. Some hospitals have special sheets printed upon which these unusual occurrences can be reported. Sometimes these occurrences or happenings are of no significance, but they may also have tremendous significance or may provide a clue or lead for the solution of some mystery or the prevention of future accidents. A chance remark may lead to the detection of a fifth columnist or the detection of a pilferer or narcotic addict.

Under any circumstances, it is well for the administrator to be kept informed of unusual occurrences in the hospital. He in turn may utilize this information to improve the efficiency of the hospital, to prevent accidents, to promote clinical knowledge or, perhaps, use an incident of drama or pathos in the hospital programme of public education. A hospital which has found a special sheet of value is the Grant Hospital of Chicago. The administrator, Clinton F. Smith, has had forms printed, headed "The Unusual Occurrence" followed by a sub-heading "Confidential Report to the Administrator." These reports are then to be signed and dated by the member of the hospital personnel. The printed sheets are distributed to the various wards and elsewhere so that it is very easy for an individual noting an unusual occurrence to immediately jot down a memo and later turn it in to the administrator.

A Tip

Glycerin and water in rubber containers may be kept cold in the ice box and used over and over again as ice caps or ice collars. This arrangement saves considerable time and is economical of supplies.

Blackout of Hospitals

It would appear that hospitals as well as other institutions and buildings are having difficulty in enforcing complete blackout. According to *Hospital and Nursing Home Management*, some matrons have adopted the course of warning nurses and their personnel that if the hospital offends, any member of the staff found responsible will be held personally liable. In the case of one large hospital the matron asked the authorities to deal seriously with the offending nurses as a warning to other members of the staff. The magistrate promptly gave the nurse a month's imprisonment.

* * *

When Pills Were Pills

Dr. Patrick Anderson, physician to Charles I, was, it is stated, the inventor of Anderson's Scots pills. H. A. J. Lamb, writing in *Hospital and Nursing Home Management*, recalls that in a house in Edinburgh there was once his portrait. The doctor was depicted in Vandyke dress, and his daughter, Lillias, "a precise looking dame," displayed between her finger and thumb, a pill nearly as large as a walnut. This, says the historian, speaks a great deal for the stomachs of our ancestors.

* * *

Caring for the Premature

The humidity best suited to stabilizing the body temperature of premature infants appears to be about 65 per cent, with a temperature ranging from 75 to 100 F., depending to some extent on the general constitutional state of the infant and the body weight.

Blackfan—Yaglou, *Premature Infant*

APPRECIATION

The Editor desires to express his appreciation of the many kind messages of sympathy received from his hospital friends on the occasion of the death of his mother, Mrs. Mary Eliza Agnew, on January the seventh.

Australia Holds Qualifying Tests for Administrators

Australia has now joined the ranks of those countries which have set up standards and will hold qualifying examinations for the licensing of hospital administrators. The Victorian Institute of Hospital Managers and Secretaries, which was organized as the result of an informal conference of managers and secretaries held two years ago, held its first annual conference in Melbourne in September. The Institute was incorporated last June. The foundation membership totalled 52, consisting of 20 fellows, 22 associates, 9 licentiates and 1 member. The Institute's primary object is the instruction of persons desiring training in hospital administration, and, with this end in view, it will set up a standard and hold qualifying examinations. A further project will be the establishment of an information bureau and the gradual formation of a reference library. *The Hospital Magazine of Australia* will act as the official organ of the Institute.

* * *

Illegitimacy

Why should the illegitimate birth rate in Canada be almost twice that of the United States? Canada had 37 per 1000 live births (1935 figures) while United States had but 20 (white population). However, the United Kingdom had 44, Germany 78 and Argentina (1938) 282 per thousand. One province of Argentina had a rate of 560 and a neighboring territory 660 per thousand! In nearly all countries but particularly Germany the rate has increased.

* * *

An Unbroken Spirit

A significant notice was received from the London Fellowship of Medicine. The Honourary Editors of the "Post Graduate Medical Journal" regretted that owing to enemy action the January issue could not be published. But here is the British spirit: they anticipate to combine this January issue with the February number.

The CANADIAN HOSPITAL

WHAT SAFER GUIDE TO
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The test of fitness of an ether for surgical anesthesia lies not in the laboratory alone, but in its ability to carry the patient safely through the period of anesthesia and with a minimum of post-operative discomfort. Squibb Ether has met that test millions of times.

Squibb Ether is used by surgeons and anesthetists in over 85 per cent of American hospitals. It is the only ether packaged in patented, copper-lined containers as a protection against oxidation—the only ether with a background of 87 years of satisfactory clinical experience.

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*For literature address E. R. Squibb & Sons of
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SQUIBB ETHER

Should a Surgeon Give His Own Spinal Anaesthesia?

To the Editor:

Is it a safe or an ethical practice for a surgeon to give a spinal anaesthetic for a major operation and then proceed with the operation, leaving the nurse to look after the patient? The operating room supervisor has her own duties as supervisor to perform as well. There is no full-time anaesthetist in this hospital.

— Reg. N., Supt.

This is a question which arises frequently, particularly in those hospitals where there is not a specialist in anaesthesia on the staff. In some of the smaller hospitals it frequently happens that the man doing the surgery may be the only member on the staff who has done extensive post-graduate work and become familiar with the details of spinal anaesthesia. Under such circumstances it is natural that he would prefer to give the spinal anaesthesia himself, rather than have a less experienced colleague do it.

However, this is not a sound procedure. In most carefully managed hospitals, there is a definite understanding that the surgeon does not give his own spinal anaesthesia. Insistence upon this ruling is based upon the frequent observation that spinal anaesthesia sometimes proves inadequate and it then becomes necessary to have a general anaesthetic given, frequently after the operation has already commenced. Moreover, instances have occurred where there has been, as a result, considerable confusion in the operating room and real danger to the patient because of this lack of adequate medical assistance at that time.

Of course, if the surgeon doing the operation be the one best qualified to give the spinal anaesthetic, there should not be objection to him introducing the spinal anaesthetic, provided a colleague prepared to give a general anaesthetic be present during the operation, so that the surgeon would have no duties in connection with the anaesthetic should it be found at any time during the opera-

tion or immediately preceding it that the spinal anaesthesia were not proving adequate.

Certainly it is not fair to the patient to have one of the nurses in the operating room take over the anaesthetic care of the patient during the operation, excepting where such nurse is a fully qualified anaesthetist, an arrangement which is not legally recognized in Canada.

It is not a matter of ethics. Actually, this situation is not specifically mentioned in the Canadian Code of Medical Ethics, although there is a very obvious implication to follow

the course outlined above in that the Code of Ethics of the Medical Profession in Canada insists that the welfare of the patient be the paramount consideration. It is primarily a matter of safety for the patient and accordingly, many hospitals have passed a rigid ruling requiring that an anaesthetist sit with the patient during any operation under spinal anaesthesia. Because of this practice in well organized hospitals, the hospitals or the doctors not following these rulings leave themselves open to criticism or an adverse court decision in case of a medico-legal suit.—G.H.A.

Hospital Exonerated in Negligence Suit Brought by Orderly

The Superior Court of Quebec, District of Montreal, has dismissed a suit for \$2,804, brought against L'Hopital St. Jeanne d'Arc by Joseph Petit, a hospital orderly. According to the evidence the orderly scratched a finger on his right hand while removing a metal cage or cradle from a hospital bed. Two days later he was admitted as a patient and for three weeks was given treatment including applications of lead solution to his finger. Later he was treated as an outpatient, but was finally returned to hospital where, because of the spreading of the infection, it was found necessary to amputate the finger. It was claimed that the treatment was improper and that the amputation was unnecessary and due to the lack of skill and knowledge on the part of the hospital and its staff. The amount claimed was made up of lost wages during illness, partial permanent incapacity and pain and suffering, etc.

An attempt was made by the plaintiff to show that he had not signed the usual form of release exonerating the hospital from liability, but the court maintained an objection to such evidence on the ground that the plaintiff had admitted his signature.

In his judgement, E. M. McDougall, J.C.S., pointed out that "It has long been established that the surgeon exercising his professional functions in a hospital is not the servant of the latter in the sense that he binds his principal by his acts. The hospital authority merely holds itself out as providing an institution where patients will be able to meet with skilled personnel who will attend them. When such authority retains the services of competent and qualified medical advisors and nurses and has provided fit and proper appliances for the treatment of patients, it has fully met its legal obligation and is not responsible for negligence of doctors and nurses while acting in the exercise of their professional functions and knowledge."

By asserting certain acts of so-called negligence on the part of the attending nurses there was apparently an effort to hold the defendant liable on the theory that the nurses at least must be regarded as the servants of the hospital. The court held however, that the plaintiff's condition received proper treatment, including nursing care and that the attending surgeons were fully justified in amputating the finger. The action was dismissed with costs.

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THE FOUNDING of The Patterson Screen Company 28 years ago was due to the successful culmination of a research project. The long quest for a satisfactory

fluoroscopic screen chemical resulted in the Standard Fluoroscopic Screen, and the inception of a business.

It is quite logical, then, that because research is the very corner stone, it should continue to be a most significant part of all Patterson activities. With the growth of the science of radiography, Patterson has carried on a constantly broadening program of research and development, in the world's largest laboratory entirely devoted to this field.

As a result of this research effort Patterson has made available to the profession many notable

achievements, including:—the first stable fluoroscopic screen without lag, the first grainless intensifying screen, the first cleanable intensifying screen, and others.

Equally important to the X-ray field has been the dependable uniformity of Patterson screens and their conformity to those self imposed high standards which have made them outstanding the world over. The company's extensive laboratory facilities and highly trained personnel make possible the detailed analysis of every chemical ingredient before it is accepted for production. During manufacture, too, laboratory control is never relaxed, so that the finished screen is as nearly perfect as modern scientific methods permit.

The great significance attributed to research in the production of fine screens will be indicated in succeeding Patterson advertisements.

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(Personnel holding medical or surgical degree not involved)

Hospital	Beds	Admin.		Nursing		Laundry		Kitchen		Cleaners & Scrubbers		House Maids		Ward Maids		Porters		Engineers & Electricians	Stokers	Gardeners & Handymen	Total	Total staff per 100 beds available
		Total	per 100 beds	Total	per 100 beds	Total	per 100 beds	Total	per 100 beds	Total	per 100 beds	Total	per 100 beds	Total	per 100 beds	Total	per 100 beds					
A	200	6	3.0	71	35.5	9	.5	7	3.5	14	7.0	13	6.5	8	4.0	7	3.5	—	1	1	151	75.5
B	244	9	3.7	105	43.0	8	3.3	6	2.5	—	—	18	7.4	15	6.1	9	3.7	—	2	2	189	77.5
C	225	12	5.3	101	44.9	8	3.6	5	2.2	5	2.2	10	4.4	10	4.4	9	4.0	1	3	4	185	82.2
D	220	14	6.4	88	40.0	9	4.1	5	2.3	3	1.4	13	5.9	11	5.0	9	4.1	3	3	3	177	80.5
E	362	14	3.9	129	33.6	16	4.4	11	3.0	27	7.5	20	5.5	14	3.9	16	4.4	2	4	5	287	79.3
F	260	13	5.0	116	44.6	10	3.8	9	3.5	6	2.3	10	3.8	14	5.4	11	4.2	1	3	12	228	87.7
G	225	9	4.0	97	43.1	9	4.0	6	2.7	7	3.1	11	4.9	12	5.3	7	3.1	2	3	2	180	80.0
H	216	13	6.0	92	42.6	9	4.2	4	1.9	12	5.6	14	6.5	8	3.7	8	3.7	2	4	3	183	84.7
I	321	12	3.7	114	35.5	11	3.4	8	2.5	25	7.8	18	5.6	10	3.1	18	5.6	3	3	2	255	79.4
J	365	13	3.6	155	42.5	17	4.7	15	4.1	15	4.1	14	3.8	28	7.7	10	2.7	2	6	5	301	82.5
K	350	21	6.0	150	42.9	17	4.9	10	2.9	13	3.7	21	6.0	14	4.0	21	6.0	3	3	2	299	85.4
L	395	13	3.3	167	42.3	22	5.6	10	2.5	14	3.5	33	8.4	22	5.6	14	3.5	4	4	11	342	86.6
M	250	7	2.8	98	39.2	9	3.6	6	2.4	5	2.0	13	5.2	9	3.6	10	4.0	1	3	—	176	70.4
N	344*	11	3.2	111	32.3	16	4.7	8	2.3	18	5.2	19	5.5	11	3.2	15	4.4	3	3	1	268	77.9*
O	256	17	6.6	108	42.2	15	5.9	11	4.3	21	8.2	16	6.3	8	3.1	9	3.5	1	3	2	230	89.8
P	210	8	3.8	87	41.4	—	—	10	4.8	—	—	16	7.6	8	3.8	10	4.8	1	3	3	156	74.3
Q	210	8	3.8	81	38.6	9	4.3	4	2.0	6	2.9	14	6.7	8	3.8	7	3.3	1	3	3	161	76.7
R	200	6	3.0	95	47.5	—	—	7	3.5	11	5.5	16	8.0	7	3.5	8	4.0	1	3	4	172	86.0
S	204	7	3.4	74	36.3	10	4.9	6	2.9	18	8.8	11	5.4	9	4.4	6	2.9	1	—	3	164	80.4
Average																					81.2	

* This hospital had 20 midwives and pupil midwives. Hospital "I" had five and Hospital "P" had one.

Only selected groups of personnel, comparable to those in Canadian hospitals, are here listed.

Prepared by the Central Bureau of Hospital Information, London. R.H.P. Orde, Director. Issued April, 1940.



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Gymnastics For Nurses in Training

POSITION! Forward march! Arms stretching in rhythm to marching—begin!" Thus begin the tri-weekly gymnastic classes of the preliminary class of the School of Nursing at the Moose Jaw General Hospital.

Some people might be heard to remark, "Oh, those poor nurses—on their feet all day long and then required to take part in gymnastic classes!" To avoid such misunderstandings, I should like to explain the purpose and aim of our gymnastic sessions.

In the first place, nurses of the preliminary class have not yet started long hours of duty on the wards. The greater part of their schedule consists of classroom lectures, with a gradual adaptation to ward duty. Thus a series of exercises every second day in the week during their preliminary term helps to keep the prospective nurses in good health, improves their circulation, their posture, and strengthens the arches of their feet, so that, after some months of this training they are more than physically fit for long hours of duty in the hospital.

A freshly starched uniform, a sweet face and a capable pair of hands can be completely erased by drooping shoulders, general listlessness of posture, and an awkward walk. A rustle of starch in any hospital corridor should be accompanied by straight shoulders, head held high, a quick smart step and a general appearance of a graceful, good carriage. Not only appearance, but health too, can be greatly affected by poor posture. Exaggerated physical fatigue, backaches, underdeveloped chests, a general falling of visceral organs, joint strains and such spinal deformities as lordosis, kyphosis and scoliosis, can all be caused by lax muscles and careless posture. It is an obvious fact that for nurses correct posture is an essential part of their general well being.

The type of exercises given are for all muscles of the body, stressing good carriage, grace and rhythm in motion, and muscle co-ordination. Defects in posture are corrected and special exercises are taught for

strengthening the arches of the feet. Rhythm and grace are achieved in free swinging exercises in which no commands are given other than the initial one—the exercise being continued by the class keeping time with their own rhythm while executing each particular exercise.

The schedule of exercises is gradually increased in complexity and length. When pupils have developed good co-ordination in arms and legs separately, then the difficulty of the exercise is increased by the co-ordination of arms and legs together, working in unison in two entirely different types of movement.

Apart from the regular table of exercises, dancing steps are taught for co-ordination muscle work and the development of strong ankles with an elasticity in the muscles that enables the pupils to carry the body lightly on the balls of the feet.

Tap dancing is taught also, for the relaxation of tight ankle muscles and a more developed sense of rhythm.

The Recording of "Deductions"

(Continued from page 26)

The adjustment is made as follows. At the beginning of each financial year, estimate how much of the doubtful accounts on hand is likely to be uncollectable because of rebates, courtesy, free and bad debts. This may already be in the ledger in one total in the form of a "Bad Debts Reserve" account. Make this the subject of a first entry, in red ink, in the journal. Ignore these red ink figures when totalling the monthly write-offs. At the end of the financial year make a further estimate of the amounts that will probably be lost from the current doubtful accounts. Compare these figures with the red ink entry made at the beginning of the year, and subtract the lesser from the greater. Enter the result in the journal as a last item for the year. If during the year there has been an increase in the doubtful figures, the entry will be in black ink, if a decrease, in red ink. The former should be added, the latter subtracted. The resulting figures will give the cor-

rect amount to be deducted from the gross earnings from services to patients without distorting the net income from services to patients for that year. Commence the new year by again making an entry in red ink of an amount which is an estimate of the figures likely to be written off later from the current doubtful accounts.

Body control is improved in "mat" exercises which include tumbling and pyramid formations.

Many entering a school of nursing, especially here in Moose Jaw, have attended rural schools and have had practically no opportunity of training in calisthenics, and therefore they have never learned the meaning of good posture. It is very gratifying, in the course of a few months, to note that they have developed into a well co-ordinated group performing exercises in perfect unison and rhythm, well enough to give a good exhibition of their gymnastic work at the end of their preliminary term.

Two or three classes of the course are set aside for instruction in the proper use of muscles when lifting patients, in order to protect nurses from muscle strains and also with the comfort and the best possible support of the patient in mind.

The nurses appear to enjoy these classes, and we have found that the time given for this type of course has been well worthwhile.

—Ruth E. Carlyle, *The Journal of the Canadian Physiotherapy Association*, 1940.

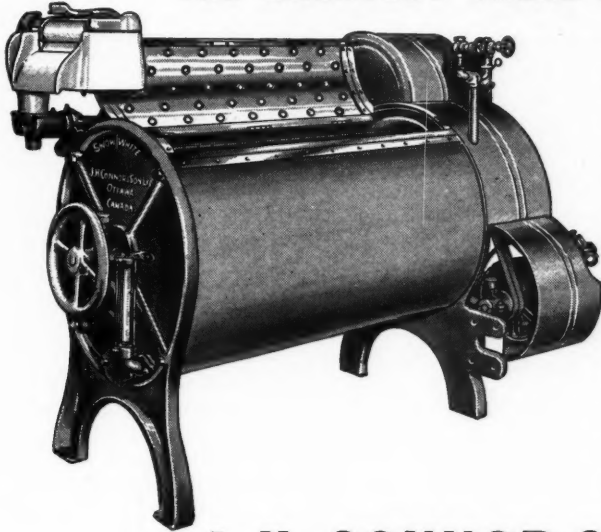
rect amount to be deducted from the gross earnings from services to patients without distorting the net income from services to patients for that year. Commence the new year by again making an entry in red ink of an amount which is an estimate of the figures likely to be written off later from the current doubtful accounts.

If an account has to be restored after it has been written off, enter it in red ink in the journal at the time of the restoration. Subtract the restored account figures from the write-offs for that month. If this procedure is followed, it will not be necessary on the Annual Revenue and Expenditure Return to make any entry on the line provided to receive entries respecting "Restored accounts receivable previously written off."

It is the experience of the writer that hospitals that have efficiently carried out the procedures recommended herein have been more than amply repaid, both in money and in goodwill, for the work and expense involved.

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Air-Raid Victims Well Cared For In Great Britain

TO take care of the victims of air-raid casualties in England, says Dr. George F. McCleary, former Deputy Senior Medical Officer of the British Ministry of Health, in the leading article in the new quarterly journal *Medical Care*, issued in January, the British nation has organized its entire hospital system, both public and private institutions, under government direction. Prime Minister Winston Churchill said to the House of Commons on October 8th last, that when Britain entered the war, air-raid casualties up to 3,000 killed and up to 12,000 wounded in a single night were expected. The actual number, however, has been far less than this, so that the arrangements made for medical care have thus far been more than ample. But provision must be made for future emergencies which still cannot be definitely forecast.

Under the British plan, England and Wales are divided into ten regions, each under the direction of an officer responsible to the Ministry of Health, and the hospital arrangements are planned in each region so that injured persons will not be retained for more than a few hours in hospitals which are in the areas most exposed to attack. As rapidly as possible they are moved to hospitals in safer localities. Elaborate arrangements have been made for safe and speedy transportation.

In 1938 the Ministry of Health made a hospital survey showing 370,000 beds in existing hospitals, not including institutions for mental disease. About one-third of these beds were in non-governmental and about two-thirds in governmental hospitals. With almost no additional construction, arrangements were made so that, to meet emergencies, the number of available beds could be almost doubled. When an emergency arises, hospitals in an area must send home at once all patients not urgently in need of continued hospital treatment. A total of 100,000 beds can thus be cleared. Many additional beds, up to a total of 150,000, can be set up in existing hospitals as emergency needs require. Only about 40,000 beds have been

provided by new construction of so-called "huts."

The medical profession of Britain has been organized for war purposes. The arrangements are designed to provide general physicians and specialists for emergency needs in cities, and also to furnish physicians required for munitions workers and their families who have gone to new centres of industrial activity. On the other hand, many persons, chiefly children, have been moved from areas likely to be exposed to continuous air attack. These changes in distribution have been allowed for in the plans for providing physicians and hospital facilities.

In the German air-raids last autumn, St. Thomas's Hospital, one of the oldest and best-known teaching hospitals in Britain, was badly damaged by three direct hits in six days, but, by scattering its medical students among other hospitals according to prearranged plan, was able to start the 1940 session of its medical school on the usual day. One of its officials remarked after the bombings: "We do not intend to be pushed out by Hitler or anyone else." The teaching of medical students throughout England has been

reorganized with this aim in view, distributing much of the work over many hospitals, instead, as formerly, of having it concentrated in a few.

Rockefeller Foundation Aids Health Experiment

An experiment in public health services is now in operation in the township of East York in Ontario. It is sponsored by the School of Hygiene of the University of Toronto and is being aided by an \$8,000 annual grant by the International Health Board of the Rockefeller Foundation.

The scheme entails adequate public health nursing services, medical service in primary schools; tuberculosis clinics; an improved sanitary inspection service; more adequate health provision of infants and pre-school children; inspection of the immunization service against communicable diseases; and a more effective system of record keeping. Dental services for school children and medical attention for secondary school pupils are being considered. The personnel will include a medical officer of health, an assistant medical officer of health, a supervisor of public health nursing and two nurses and an extra sanitary inspector in addition to the regular staff of the municipality.



A Young Patient at the Winnipeg Children's Hospital

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Most Traffic Accidents Between Five and Six P.M.

The analysis of the motor accidents in 1939 in the City of Toronto reveal that the highest percentage (10.73) occurred in between five and six p.m. The lowest figure (.36%) occurred from 5 a.m. to 6 a.m. This figure gradually rose during the day to the peak in the evening rush hours. This rise was almost a steady curve except for a jump up between 8 and 9 in the morning, when the percentage was 3.57. After 6 p.m., the incidence gradually fell until at the hour of 10 to 11 p.m. it had fallen to 3.87. There was a slight rise from here to the hour after midnight, during which the percentage was 4.08 and then it rapidly fell to the low of .36%.

This interesting analysis has been made by A. G. Dalzell of the Department of City Planning and Survey, of which the Commissioner is T. D. le May. These figures indicate also that Sunday has the least accidents, 9.88% of the week's total with the figure rising during the week to a high of 19.73% on Saturday. February has the least number of accidents, possibly due to the shortness of the month, high marks going to December (10.64%) October and June.

Most accidents were caused by not having right of way (36.69%), with fast driving in second place (29.85%). Being on the wrong side of the road caused 13.30% and 8.01% were due to passing on a hill. "Cutting in" caused 4.52% of the accidents.

Nearly half of the drivers involved (46.71%) were from 25 to 40 years of age. Only 3.04% of the accidents were due to drivers with experience of only 1 year or less.

42.13% of the accidents occurred between street intersections, 71.65% occurred in clear weather and only 3.93% in snow or sleet. 60.95% occurred in daylight with 39.05% in dusk or dark. 21.42% of the pedestrians who were injured were crossing between intersections and 20.17% were hit when coming from behind parked vehicles or objects. 5.23% were hit at crossings when walking against the signal.

Two age groups were most affect-

ed. The group from 5 to 9 years contributed 24.83% of the total injury, though their population group was but 8.02%. Those of 65 years and over contributed 11.41% of the total injured in a population group of 4.40%. As would be expected the young people, 20 to 24, were most involved after midnight and older people of 55 years or more were injured largely between 4 and 8 p.m.

39.54% of charges against drivers were due to disobeying stop signs. 30.92% were charged with driving with immoderate speed and 16.56% were persons who disobeyed traffic signals.

The death rate in motor vehicle accidents was 8.05 per 100,000 population. While this is altogether too high, it is considerably below that of neighbouring cities. For instance, in Detroit, the rate is 11.90; in Buffalo it is 13.90 and in Chicago it is 19.90. Los Angeles has a high of 34.80.

Halifax Takes Active Steps to Combat Communicable Diseases Epidemic

The epidemic of diphtheria and scarlet fever and the increased number of meningitis and measles cases in Halifax has caused great concern to the municipal authorities. Since last autumn 350 diphtheria cases have been reported, of whom 10 have died. There have also been more than 175 cases of scarlet fever in the same period. Forty-five cases of meningitis with five deaths have been reported since November. Measles has been more than normally prevalent this winter. The epidemic has severely overtaxed the infectious diseases hospital with the result that in January, the city took over a large building on Tower Road as an emergency annex to the hospital. A large number of diphtheria cases are reported to have been admitted by the military and naval authorities to the Rock Head Hospital. Dartmouth, across the harbour, has also been affected by the epidemic and now finds itself without an institution for the care of

Serious Shortage Discovered at Sarnia General Hospital

An audit of the books of the Sarnia General Hospital is said to have revealed a shortage of \$3,833.20. As a result of the information furnished in a special audit, Edward M. Naylor, former superintendent of the hospital, has been formally charged with the theft of this amount from the hospital. The incident has caused considerable public concern in Sarnia as the hospital is a municipal one and, as a result, the city council has decided to hold a general audit of all civic departments. This audit is to be considered as a purely routine matter and is not intended to reflect in any way upon the honesty of any official or department.

Summerside Hospital Receives Bequest

The Board of Directors of the Prince Edward Island Hospital at Summerside has received a bequest of \$10,000 from Miss Amanda Macdonald of Fairhaven, Mass. The money is to be applied to the endowment fund in memory of a sister Miss Annie A. Macdonald.

these patients, as Halifax is not now able to admit Dartmouth patients as has been the custom in the past.

The city commissioner of health, Dr. Alan R. Morton, though working night and day, has not been able to meet all the demands on his time, with the result that arrangements were made for the appointment of a fulltime doctor to assist Dr. Morton in perserving the health of the city.

On January the 27th a medical mission from Harvard University arrived by plane to help the authorities in checking the outbreak.

From reports received, it would appear that the incidence of diphtheria among military forces has been much higher than among the civilian population. Some criticism has been voiced that the federal military authorities had not sanctioned the immunization procedures among soldiers, many of whom have been going back and forth on leave or to or from other camps.

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NAME

ADDRESS

Kingston General's First Medical Superintendent Still Active at 94

"The happiest recollections of my life are the memories of the people I have met", said Dr. Ephraim Hooper on his 94th birthday, recently celebrated at the home of his son in Toronto. "I have one failing and that is that I love humanity. At my age I might give advice that would be out of focus with the young people for whom it was meant; I prefer to give it in my own way, and that is by showing appreciation of all things around me."

Dr. Hooper has had an interesting life. Born in Bermondsey, London, on January 3rd, 1847, he lived in France for a while and then came to Canada in 1868. During the North-West Rebellion he served as a surgeon with No. 2 Field Hospital Corps and, in 1887 became the first resident superintendent of the Kingston General Hospital. The hospital, of course, was then long established, having been started in 1833 although not used for hospital purposes until 1845. His salary was set at \$500 a year with residence and board for self, wife and family. His duties were to include those of steward and he was to have supervision and authority over the resident medical officer, the head nurse and other

employees. He held this post at an increased salary until 1891. For some time he was a professor in the first Women's Medical College, located at Kingston. Later he practised for many years in Toronto, for part of which time he was also pastor-preacher of one of the Baptist churches in that city.

One of his sons, Dr. E. Ralph Hooper, a medical missionary, was prominently mentioned in press despatches a few years ago during the Italian conquest of Ethiopia.

During his lifetime Dr. Hooper has met many prominent people. Among them were John Bright, Joseph Chamberlain, C. H. Spurgeon, Horatio and Andrew Bonar, Alexander Melville Bell and his son, Alexander Graham Bell, and Dr. James Johnson. "I saw Napoleon the 3rd in Paris in 1868 when he was Emperor of France", he related "and that was a time when one would not have dared sing 'La Marseillaise'. And I can remember distinctly Napoleon's funeral." Dr. Hooper is in excellent health, is up every morning at 6.30 and is first at the breakfast table at 7. He still preaches in Toronto pulpits several times a year.

Construction

The Kindersley Union Hospital Board, Kindersley, Saskatchewan, recently passed a motion approving a canvass to raise funds for the construction of a modern hospital building and approving the extension of the Union Hospital District.

The Metropolitan General Hospital, Windsor, Ontario, is planning the construction of a new addition to house the cancer clinic and provide a ward for psychopathic cases.

The provincial government has promised a grant to aid in construction of the proposed 20-bed hospital

PHYSIOTHERAPIST WANTED

—qualified to organize and take full charge of physiotherapy department in 250 bed hospital, Brantford General Hospital, Brantford, Ontario.

to be built by the Sisters of Jesus at Notre Dame du Lac, Quebec.



Appointments and Resignations

Lieut.-Col. D. A. Warren, R.C.A.M.C., former president of the Hamilton Academy of Medicine, has been appointed officer in charge of the newly established military hospital for convalescent soldiers at Chorley Park, Toronto, Ontario.

E. Norman Smith has been appointed chairman of the Civic Hospital Board, Ottawa. Mr. Smith has been vice-chairman of the board and succeeds J. J. Lyon, whose death occurred in November.

Mr. E. P. Webber, accountant and assistant superintendent at the Victoria General Hospital, Halifax, has retired. Mr. Webber had been on the executive staff of the hospital for forty-one years.

Dr. G. H. Malcolmson, radiologist for the Royal Alexandra Hospital, Edmonton, has resigned to become director of cancer services for the province. Dr. P. H. Malcolmson, his son, will continue the hospital work.

Miss Mary Crossman of Saint John, N.B., has been appointed superintendent of the Aberdeen Hospital, New Glasgow, N.S. Miss Crossman, who is a graduate of the McGill University Nursing School, has been acting superintendent since the resignation of Miss Marian Boa some weeks ago.

Hospital Discontinues Training School

The Alexandria Hospital at Godrich, Ontario, has discontinued its training school and will henceforth be staffed by graduate nurses. The nurses in training have been transferred to western Ontario hospitals conducting training schools.

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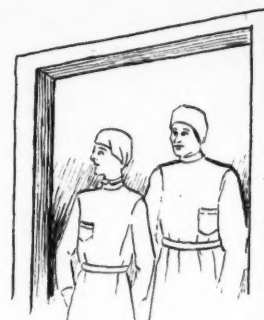
FEBRUARY, 1941

**FREE: Two Authoritative
Articles Relative to Bran
and Constipation**

In recent months, there have appeared in leading American medical journals two important articles on bran cereals in the treatment of constipation. One, *Does Bran Produce Intestinal Obstruction?*; the other, *Roentgen Study of Intestinal Motility as Influenced by Bran*. ** Reprints of these interesting articles are available to any physician through the courtesy of KELLOGG'S ALL-BRAN. Write Box A, Kellogg Co. of Canada, Ltd., London, Ontario.

*The American Journal of Digestive Diseases, Feb. 1940, Vol. VII, No. 2, 60-63.
**The Journal of the American Medical Association Feb. 3, 1940, Vol. 114, No. 5, 404-408.

Is This A Record?



The Dauphin General Hospital thinks it may have set a record by its two "double feature" deliveries within two hours in December. The two sets of twins, a completely feminine contingent, arrived under

the sponsorship of Dr. R. E. Dicks and ten days later the four babies left the hospital together, bound for their respective homes. The first baby (3 lbs. 15¼ ounces) arrived at 9.25 a.m., her partner (14¼

ounces heavier) appearing on the scene 18 minutes later. The first member of the second partnership was born at 11.40, weighing 4 lbs. and 2¾ ounces. Her sister, last but certainly not least at 5 lbs. exactly arrived at 11.50 a.m. What a morning!

Civilian Facilities Available

Continued from page 13

make available their full facilities, or a large portion of them, was included in the list.

Conversion of Additional Space

In their replies a number of hospitals indicated that varying amounts of space were available for hospital use if necessary. In some cases a building on the hospital grounds could be set up as additional wards. Some hospitals indicated that nearby buildings not the property of the hospital itself might be considered should additional space be required, presumably with the thought that any bed accommodation set up therein could be maintained by the hospital staff. It was presumed that the equipment necessary would be supplied by the government as very few hospitals have spare equipment not now in use. It is understood that the government has certain reserves of equipment which might be utilized.

As the replies indicated, approximately 8,000 existing beds are available should occasion arise and over 5,000 additional beds could be set up in available convertible space. A total of over 13,000 beds can be considered as potentially available in the hospitals making reply. These represented almost exactly two-thirds of the hospitals with 50 beds or over and, as the hospitals replying seemed to be a fair cross section of the hospitals of 50 beds or over and of the sanatoria, the hospitals

might be counted upon to make available in a pinch up to ten to twelve thousand existing beds and possibly set up from 6,500 to 7,500 additional beds if necessary. Allowing for a 20% reduction from these figures for possible error in making reply or for the possibility that those replying are more concerned with aiding the war effort than the others, the number of actual and potential beds available makes a striking figure.

Personnel Available

The replies indicate, as shown on the table, that nearly 500 personnel in selected categories could be released if necessary. These figures do not include many groups, such as engineers, painters, office workers, orderlies and others who might be needed for military services or civilian services closely related to the war effort. They do represent groups, however, concerning whom there is frequent discussion as to the possibility of shortage of supply.

It must not be inferred that these figures indicate that hospitals are overstaffed. Very few hospitals, indeed, have any staff nurses, dietitians, technicians or others whom they could spare without noticeable impairment of their services. They do, however, indicate an effort on the part of the hospitals to show the extent to which they could co-operate in a national effort by paring their technical and other services to the very minimum.

A large number of hospitals indicated their willingness to give short courses of training to those

desiring to become proficient as radiological technicians or as clinical laboratory technicians. In all the replies indicated that some 360 could be given short courses of training. There is no proposal at the moment that these offers be taken up. Nor has there been any request from the government that hospitals give courses of training. Although there is no doubt but that the offers to give these courses from so many hospitals will be deeply appreciated by the government, it is logical to anticipate that when the time comes to provide such training, the courses will be limited to those institutions where careful investigation reveals that technical departments in the hospital are sufficiently organized to give a really adequate course of instruction. In view of the developments of the past year tending to raise considerably the standards of instruction in the institutions providing such training, courses which would not permit those taking them to continue their work later in civilian life would be not only disappointing to the individual but costly in the final analysis to the government.

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Group Hospitalization — the Logical Solution

(Continued from page 14)

nual check, will be given. The "plan" is then permitted to use the emblem of the Blue Cross on all its membership cards and publicity.

Experience has shown the value of such plans to the hospitals of the community. Thirty-eight per cent of the total hospitalization furnished under the plan would ordinarily have been provided as forward patients. In other words, 38 per cent of the hospitalized members are treated on a fully paid basis instead of part charity as otherwise would have been the case. On the basis of the requirements of most hospitals, 50% of the population would be eligible for free treatment. Based on United States figures this would mean that almost 60,000,000 persons would qualify in this respect. Any reduction in this tremendous load by means of hospital ser-

vice insurance will help the hospitals, help the individual and, as previously stated, reduce the charity load.

Probably the upper third of our population can handle their hospital accounts, perhaps not conveniently but without too much hardship. The lower third are provided for through public funds or charity. It is the middle third for whom these insurance plans are primarily designed. Even the lower bracket in this middle third, such as families on \$1,000 or less, may not be in a position to handle the full expense and for this group a ward plan is being advocated and tried out in a number of centres. This may or may not be associated with a medical service plan, but as this lower income group cannot pay medical fees as ordinarily understood, it will be necessary to budget medical care for them in a manner similar to the hospital account. This is not state

medicine, but is another step in enabling the self-respecting and ordinarily self-sustaining section of our population to protect themselves against the expense of hospitalized illness.

It has been authoritatively stated that "the development of plans for complete hospital service, inclusive of medical fees would reduce the need for taxation and philanthropy, preserve the values inherent in private medical practice, protect professional standards and enable voluntary hospitals more adequately to fulfil their functions."

What has been achieved? The above is taken from this year's report on experience in the State of Massachusetts, but, it is the same story from California to Carolina, from Winnipeg to New Orleans—security, independence, self-respect and improvement in community morale, an arrangement wherein everyone is benefited and no one loses.

Government Issues Booklet on Nitrous Fume Poisoning

Nitrous fume poisoning is most likely to occur among people who work with chemicals. It has been observed among artificial leather workers, blasters, bleachers, nitric acid workers, nitro-cellulose and nitro glycerine makers, photo-engravers, welders, torch cutters, pyroxylin plastic and sulphuric acid workers, metal refiners and cleaners, galvanizers, hat workers, etchers and electro platers, and in a number of other industries. Nitrous fumes have an irritating effect on the respiratory passages and ultimately do serious damage to the respiratory tissues. In addition, the fumes may be absorbed into the blood stream and poison the whole body.

Acute poisoning may result in congestion of the lungs with fluid as the result of the irritation. These symptoms do not develop in many cases for some hours after exposure; therefore, workers developing a violent cough on exposure should be placed at rest and under observation for some time because of the possibility of a lung lesion developing after apparent recovery.

Chronic poisoning is much more

difficult to detect. It may be manifested by chronic cough, headaches, loss of appetite, constipation, corrosion of the teeth and inflammation of the mouth, nose and eyes. The effects of nitrous fumes on the body are insidious and it cannot be too strongly stressed that even a slight exposure to these fumes may kill.

Although not stated in the booklet, it would seem desirable that hospital authorities, upon the diagnosis of acute or chronic nitrous fume poisoning, should notify the employer as well as the provincial departments of health and labour, so that care could be taken to prevent a repetition of the exposure.

Why Interns Turn Gray Trying To Get Some Histories

Old father John is sick and sad;
A careless man was he
Who lost the health he thought
he had

And now has misery.

His doctor comes; says he, My friend
What may the ailment be?

Doc, I'm 'fraid I'm near the end;
I'm full o' misery.

But tell the doctor; tell me, first,
What may the chief hurt be?

What would you say was likely most
To cause this misery?

Doc, I am a sick ole man;
Just 'twixt yourself and me
I hurt all over; poor ole Jan's
Chock full o' misery.

* "Misery", W.L.S. in Journal of the Association of American Medical Colleges.

Price Trends

	Yearly Average 1939	December 1939	November 1940	December 1940
(On basis 1926=100)				
Building and Construction				
Materials	89.7	94.2	98.5	98.3
Consumers' Goods				
(Wholesale)	75.9	81.4	84.9	85.2
(On basis 1935-1939=100)				
Cost of Living	101.5	103.8	107.8	108.0

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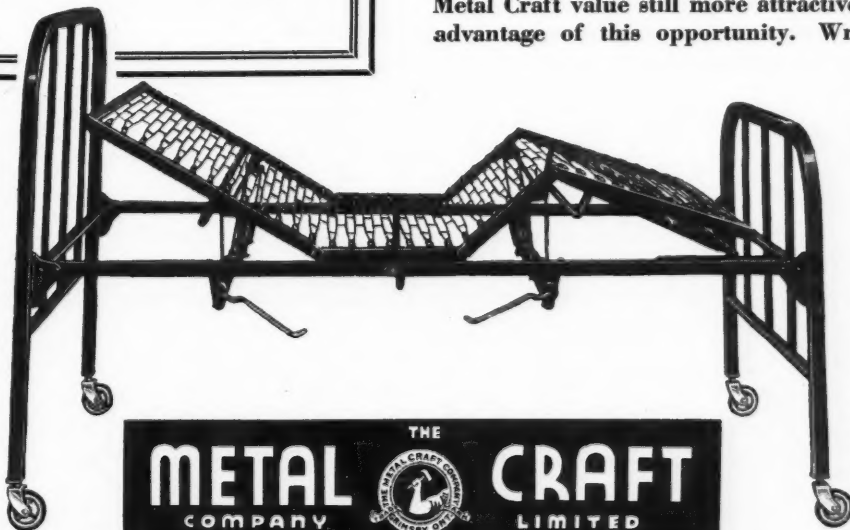
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